IN THE CLAIMS

1. (withdrawn) A method for acquiring an image on an imaging system, said method comprising:

accessing at least first image data from a first imaging system;

processing the first image data in accordance with a CAD algorithm;

acquiring at least second image data based upon results of the CAD algorithm; and

processing the second image data in accordance with the CAD algorithm to confirm the results of the CAD algorithm regarding the first image data.

2. (withdrawn) A method in accordance with Claim 1, wherein the second image data is acquired from the first imaging system.

3. (withdrawn) A method in accordance with Claim 1, wherein the second image data is acquired from a second imaging system.

4. (withdrawn) A method in accordance with Claim 3, wherein the first and second imaging systems are of different imaging modalities.

5. (withdrawn) A method in accordance with Claim 3, wherein at least one of the first and second imaging systems is a CT system.

6. (withdrawn) A method in accordance with Claim 1, wherein the first imaging system is a CT system.

7. (withdrawn) A method in accordance with Claim 1, wherein the second image data is acquired on the first imaging system but with a different system configuration than that used for acquiring the first image data.

8. (withdrawn) A method for acquiring an image on an imaging system, said method comprising:

receiving an indication of examination type prior to any image data acquisition operation;

accessing at least first image data from a first imaging system;

processing the first image data in accordance with a CAD algorithm;

acquiring at least second image data based upon results of the CAD algorithm; and

post-processing the second image data based on the received examination type without operator intervention.

9. (withdrawn) A method in accordance with Claim 8, further comprising displaying the post-processed second image data without operator intervention.

10. (withdrawn) A method in accordance with Claim 8, wherein the second image data is acquired without operator intervention.

11. (withdrawn) A method in accordance with Claim 8, further comprising prompting a user to prescribe a scan prescription different than a scan prescription used to generate the first image data based upon results of the CAD algorithm.

12. (withdrawn) A method in accordance with Claim 11, wherein said prompting comprises prompting the operator to use an imaging modality different than a modality used to generate the first image data.

13. (withdrawn) A method in accordance with Claim 11, wherein said prompting comprises prompting the operator to use an imaging modality the same as a modality used to generate the first image data but with different parameters.

14. (withdrawn) A method in accordance with Claim 11, wherein said prompting comprises recommending a scan prescription based upon results of the CAD algorithm.

15. (withdrawn) A method in accordance with Claim 12, wherein the modality used to generate the first image data is CT.

16. (withdrawn) A method for acquiring an image on an imaging system, said method comprising:

accessing at least first image data from a first imaging system using a first scan prescription;

processing the first image data in accordance with a CAD algorithm;

prompting a user to prescribe a second scan prescription different than the first scan prescription based upon results of the CAD algorithm; and

acquiring at least second image data using the second scan prescription.

17. (withdrawn) A method in accordance with Claim 16, wherein said prompting comprises recommending a scan prescription based upon results of the CAD algorithm.

18. (withdrawn) A method in accordance with Claim 17, wherein said recommending comprises recommending an imaging modality different than an imaging modality used to obtain the first image data.

19. (withdrawn) A method in accordance with Claim 18, wherein the modality used to obtain the first image data is CT.

20. (withdrawn) A method in accordance with Claim 17, wherein said recommending comprises recommending an imaging modality the same as an imaging modality used to obtain the first image data.

21. (withdrawn) A method in accordance with Claim 16, further comprising processing the second image data in accordance with the CAD algorithm to confirm the result of the CAD algorithm regarding the first image data.

22. (currently amended) A method for ~~seamless a~~ a seamless display and analysis of dual resolution image data, said method comprising:

reviewing image data at low resolution;

performing a volumetric analysis of at least one feature of interest in the low resolution data;

substituting high-resolution image data for analyzed low resolution data without operator intervention; [[and]]

analyzing the high-resolution image data; and

linking the low resolution data to the high resolution data to facilitate seamlessly displaying a volume rendering of the low resolution data and analysis results of the high-resolution data in a single display.

23. (original) A method in accordance with Claim 22 wherein an area in an object in which the high-resolution data represents is selected based on results of a CAD algorithm.

24. (original) A method in accordance with Claim 22 wherein the high resolution data is present for only the features of interest identified by a CAD algorithm.

25. (currently amended) A method in accordance with Claim 22 further comprising obtaining high resolution data representative of an area in an object for which high resolution data is absent has not been obtained.

26. (withdrawn) An imaging system comprising:

a first image data acquisition system configured to acquire medical images; and

a computer coupled to the image data acquisition system and configured to generate a first series of images from image data acquired by the acquisition system to process series of images via a CAD algorithm, to prescribe acquisition of a second series of images based upon results of the CAD algorithm, and to process the second series of images via the CAD algorithm to confirm the result of the CAD algorithm regarding the first series of images.

27. (withdrawn) A system in accordance with Claim 26, wherein the second series of images is acquired from the first image data acquisition system.

28. (withdrawn) A system in accordance with Claim 26, further comprising a second image data acquisition system, wherein the second series of images is acquired from the second image data acquisition system.

29. (withdrawn) A system in accordance with Claim 28, wherein the first and second image data acquisition systems are of different imaging modalities.

30. (withdrawn) A system in accordance with Claim 26, wherein said computer further configured to receive an indication of exam type prior to any image acquisition operation, and post-process the second series of images based on the received examination type without operator intervention.

31. (withdrawn) A system in accordance with Claim 26 wherein the first image data acquisition system is a CT system.

32. (withdrawn) A system in accordance with Claim 26, wherein the second series of images is acquired on the first image data acquisition system but with a different image configuration than that used for acquiring the first series of images.

33. (withdrawn) A system in accordance with Claim 26, wherein the second series of images is acquired without operator intervention.

34. (withdrawn) A system in accordance with Claim 26, wherein the computer system is configured to propose the prescribed acquisition of the second series of images in an operator interface of the first image data acquisition system.

35. (withdrawn) A computer program for acquiring medical image data, the program comprising:

a machine readable medium; and

a computer program stored on the medium and including routines for receiving an indication of examination type prior to any image data acquisition operation, acquiring a first series of images from a first imaging system; processing the first series of images in

accordance with a CAD algorithm; acquiring a second series of images based upon results of the CAD algorithms, and post-processing the second series of images based on the received examination type without operator intervention.

36. (withdrawn) A program in accordance with Claim 35, wherein the computer program further includes a routine to confirm the result of the CAD algorithm regarding the first image data.

37. (withdrawn) A program in accordance with Claim 35, wherein the second series of images is acquired from a second imaging system.

38. (withdrawn) A program in accordance with Claim 37, wherein the first and second imaging systems are of different imaging modalities.

39. (withdrawn) A program in accordance with Claim 36, wherein the computer program further includes routines for prompting a user to prescribe a second scan prescription different than the first scan prescription based upon results of the CAD algorithm, and acquiring at least second image data using the second scan prescription..

40. (currently amended) A computer program for acquiring medical image data, the program comprising:

a ~~machine-readable~~ <u>computer-readable</u> medium; and

a computer program stored on the medium and including routines for:

receiving low resolution image data;

performing a volumetric analysis of at least one feature of interest in the low resolution data;

substituting high-resolution image data for analyzed low resolution data without operator intervention; [[and]]

<u>analyzing the high-resolution image data; and</u>

<u>linking the low resolution data to the high resolution data to facilitate seamlessly</u> displaying a volume rendering of the low resolution data and analysis results of the high-resolution data in a single display.

41. (original) A program in accordance with Claim 40 wherein an area in an object in which the high-resolution data represents is selected based on results of a CAD algorithm.

42. (original) A program in accordance with Claim 40 wherein the high resolution data is present for only the features of interest identified by a CAD algorithm.

43. (currently amended) A program in accordance with Claim 40 further comprising a routine for obtaining high resolution data representative of an area in an object for which high resolution data is absent has not been obtained.

44. (currently amended) An imaging system comprising:

a first image data acquisition system configured to acquire medical images; and

a computer coupled to the image data acquisition system and configured to:

receive low resolution image data;

perform a volumetric analysis of at least one feature of interest in the low resolution data;

substitute high-resolution image data for analyzed low resolution data without operator intervention; [[and]]

<u>analyze the high-resolution image data; and</u>

display <u>link the low resolution data to the high resolution data to facilitate seamlessly displaying</u> a volume rendering of the low resolution data and analysis results of the high-resolution data in a single display.

45. (original) A system in accordance with Claim 44 wherein an area in an object in which the high-resolution data represents is selected based on results of a CAD algorithm.

46. (original) A system in accordance with Claim 44 wherein the high resolution data is present for only the features of interest identified by a CAD algorithm.

47. (currently amended) A system in accordance with Claim 44 further comprising a routine for obtaining high resolution data representative of an area in an object for which high resolution data is absent has not been obtained.